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Published in:
Evaluation

DOI:
[10.1177/1356389017697622](https://doi.org/10.1177/1356389017697622)

Publication date:
2017

Document Version
Publisher's PDF, also known as Version of record

[Link to publication in ResearchOnline](#)

Citation for published version (Harvard):

McHugh, N, Biosca , O & Donaldson, C 2017, 'From wealth to health: evaluating microfinance as a complex intervention', *Evaluation*, vol. 23, no. 2, pp. 209–225. <https://doi.org/10.1177/1356389017697622>

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From wealth to health: Evaluating microfinance as a complex intervention

Evaluation

2017, Vol. 23(2) 209–225

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DOI: 10.1177/1356389017697622

journals.sagepub.com/home/evi



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Abstract

Innovative interventions that address the social determinants of health are required to help reduce persistent health inequalities. We argue that microcredit can act in this way and develop a conceptual framework from which to examine this. In seeking to evaluate microcredit this way we then examine how randomized controlled trials, currently considered as the ‘gold standard’ in impact evaluations of microcredit, compare with developments in thinking about study design in public health. This leads us to challenge the notion of trials as the apparent gold standard for microcredit evaluations and contend that the pursuit of trial-based evidence alone may be hampering the production of relevant evidence on microcredit’s public health (and other wider) impacts. In doing so, we introduce new insights into the global debate on microfinance impact evaluation, related to ethical issues in staging randomized controlled trials, and propose innovations on complementary methods for use in the evaluation of complex interventions.

Keywords

complex interventions, ethics, health, microfinance, RCTs

Introduction

Given the limits to population health improvement through traditional means, there is growing recognition of the need to identify new initiatives that seek to alleviate the complex, interactive processes and systems that can lead to ill health (Commission on Social Determinants of Health, 2008; Marmot, 2010). In this article, we argue that ‘microcredit’ has the potential to

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be considered as a non-obvious public health measure. By ‘non-obvious’, we mean that such initiatives possess characteristics that act on upstream determinants of health even if the initiatives do not recognize this in their stated objectives or missions (Roy et al., 2016).

Exploration, at both theoretical and empirical levels, of the association between the use of microcredit – small loans provided at fair interest rates to low-income people who lack collateral and credit history – and health is not new (Angelucci et al., 2015; Donaldson et al., 2011; Mohindra and Haddad, 2005; Pronyk et al., 2007). However, previous work predominately focuses on the role of microcredit either in facilitating the purchase of health services or as a vehicle through which health initiatives can be provided or accessed. Research has not investigated the potential of microcredit, in and of itself, to act in the more pervasive role of a public health intervention.

Such a proposition, however, lacks a conceptual base. Thus our initial aim, as articulated in this article, is to address this gap. This conceptualization, however, then leads to the inevitable question of how to test the proposition that engagement with microcredit could impact on health and wellbeing, our attention being on how to do this in a European context. Given their association with health and medicine and their adoption as somewhat of a ‘gold standard’ by many academics in the microcredit field, it is natural to think of randomized controlled trials (RCTs) as the most appropriate method. However, such a proposition would ignore recent developments in evaluating community-based public health initiatives, which has moved onto a more eclectic approach to study design for such complex interventions (Medical Research Council, 2008). Indeed, we would contend that such developments highlight the lack of suitability of RCTs for examining all potential areas of impact. By calling into question the adoption of RCTs as a ‘gold standard’, we introduce new insights into the global debate on impact evaluation. We finish by proposing innovations on methods for use in the evaluation of complex interventions such as microfinance.

Microcredit and its potential as a public health initiative

The provision of microcredit seeks to address financial market failures that have led, and continue to lead, either to the poorest in society being excluded from formal capital markets or, in the instances when capital can be obtained, to its high cost limiting the benefit of attainment (Stiglitz, 1990). The ability and success of serving this previously untapped financial market has resulted in these individuals being transformed into the ‘bankable poor’ (Weber, 2004). While microcredit remains primarily associated with developing countries, institutions offering these credit schemes have also emerged in richer, more developed countries, such as the UK, in response to problems of financial exclusion (Lenton and Mosley, 2012; McHugh et al., 2014).

The manifest outcomes of providing financially excluded (and frequently unemployed) individuals access to microcredit are consumption smoothing (personal lending), and self-employment and income-generation (enterprise lending). Measuring such outcomes tends to be the focus of microcredit impact evaluations. Yet we argue that further outcomes of interest exist; such as health and wellbeing.

The context of our research is that, in countries such as the UK, enduring and widening health inequalities (Marmot, 2010) mean that there is a need to supplement world-class health services and public health practices with more ‘upstream’ actions that acknowledge persistent,

and even growing, inequalities in social determinants of health (Whitehead and Popay, 2010). This involves shifting from attempting to ‘fix’ health problems, by focusing on individual pathologies and risk factors, towards creating a greater awareness of the importance of social relationships, purposeful activity, community processes and social contexts in creating health (Hanlon et al., 2012). In this respect, microfinance, an atypical form of banking that is about ‘more than money’ has potential to focus on the ‘causes of the causes’ of ill health and is coherent with recent thinking in public health (Marmot, 2010).

However, the microfinance literature has focused on the more-instrumental, direct, relationship between microfinance and health; for example, the capacity of microfinance institutions (MFIs) to improve access to healthcare and the effects of incorporating health-related services into the delivery of microfinance (Leatherman et al., 2012). In this regard, the literature has focused on both financial services, such as health insurance or health savings, or non-financial services, such as health education, to address issues ranging from HIV/AIDS and tuberculosis prevention to neurologic disorders and adherence to international breastfeeding recommendations (Boccia et al., 2011; Dworkin and Blankenship, 2009; Hargreaves et al., 2011; Smith, 2002; Wong and Mateen, 2014). Largely unexplored is the underlying theory behind the relationship between microcredit (itself) and health and wellbeing.

The first step in developing such a theory is to recognize that health inequalities, such as those in the UK, follow a social gradient (Acheson, 1998; Department of Health and Social Security, 1980; Marmot, 2010). Consequently some prospective recipients of microcredit (the financially excluded and the unemployed) are likely to be suffering from poorer health. Potentially microcredit for enterprise could act upon some of the causes of ill health given the links that health has with unemployment and income (Adler et al., 1993; Baumberg, 2016; Kasl and Jones, 2000; Marmot, 2010; Patrick, 2014; Preston, 1975; Pritchett and Summers, 1996; Subramanian and Kawachi, 2004). Associations have also been noted between microcredit for consumption and positive changes in health behaviours (Lenton and Mosley, 2012). Moreover, microcredit can encourage social connectedness (Pronyk et al., 2008), empowerment (Kim et al., 2007; Ngo and Wahhaj, 2012), feelings of purposefulness and facilitate an escape from the sense of stigmatization, prejudice and shame towards, and amongst, claimants of welfare payments such as Jobseeker’s Allowance (JSA) in the UK (a financial benefit provided to the unemployed) (Baumberg, 2016; Patrick, 2014; UK Government, 2016; Valentine and Harris, 2014).

Equally though, access to microcredit, by nature, involves becoming indebted and there is a wide literature suggesting indebtedness contributes to the development of mental health problems (Fitch et al., 2011). Similarly, while self-employment (a potential outcome of microcredit for enterprise) has long been associated with greater autonomy and control over decision making (Eden, 1975; Lewin-Epstein and Yuchtman-Yaar, 1991; Parslow et al., 2004), studies also show self-employed individuals are considered to be more susceptible to isolation and job stress (Chay, 1993; Dellot, 2014; Jamal, 1997; Lewin-Epstein and Yuchtman-Yaar, 1991) and, for some, this could be a precarious form of employment (Benach et al., 2000; Facey and Eakin, 2010). Moreover, the complex pathways through which impact is likely to occur mean that it is unlikely to act in the same direction; for example, transitioning from unemployment to self-employment may improve self-esteem and feelings of purposefulness if employment is meaningful but not improve income levels and could reduce time available for family life or socializing.

The potential links and pathways from microcredit to health and wellbeing are delineated in the conceptual framework, illustrated in Figure 1. Four classifications of mediating mechanisms were identified in the relationship between microcredit and health and wellbeing: (i) financial/income-related outcomes; (ii) employment and human capital investments; (iii) health behaviours, lifestyle factors, and health investments (either directly or indirectly by changing consumption and investment patterns); and (iv) individual assets, including resilience, self-esteem and empowerment. Solid arrows portray certain direct associations in the literature and more indirect pathways, where the nature of associations is unclear, are depicted using intermittent lines.

The relationship between microcredit and health and wellbeing is also portrayed at three levels: individual, community, and society. The contention is that a microfinance intervention might affect the socio-economic conditions that influence the health of individuals, communities and society as a whole, i.e. the social determinants of health. At an individual level, an individual's permanent characteristics can determine their perception and experience of the link between microcredit and health as well as their likely participation in a microcredit programme. The characteristics of the microcredit programme will also determine its impact. Finally, the target, scale and type of initiative will influence physical, social and personal assets.

At the community level, microcredit services are thought to influence social networks, social cohesion and social capital levels. Prior levels of community support, cohesion and integration will also likely determine the demand and impact of microcredit, but will be equally affected by the intervention through spill-overs. Finally, at a more general level, individual as well as social and community factors are nested within general socio-economic, cultural, and environmental conditions. While microcredit may impact these wider determinants of health through social and community factors, these same factors may influence final health outcomes and, thus, the nature of the relationship between microcredit and health.

The establishment of a conceptual framework provides the basis from which to evaluate 'microcredit as a public health initiative'. Given their recent prominence, seeking to examine microcredit in this way led us to consider the use of RCTs. This has resulted in interesting insights, so far unrecognized in the literature, regarding their suitability and application as a tool of evaluation.

Randomized trials of microfinance

The use of RCTs in development economics and, particularly, in the microfinance arena continues to increase in popularity. Recent initiatives such as the Abdul Lateef Jameel Poverty Action Lab (J-PAL), Innovations for Poverty Action (IPA) and the International Initiative for Impact Evaluation (3ie) have promoted the use of RCTs as the best way of assessing impact in development (3ie, 2016; Innovations for Poverty Action, 2014; J-PAL, 2016). Additionally, high profile academics, such as Esther Duflo and Abhijit Banerjee (who are also directors of J-PAL) purport the use of RCTs – 'The cleanest way to answer these questions is to mimic the randomized trials that are used in medicine to evaluate the effectiveness of new drugs' (Banerjee and Duflo, 2011: 8). As a result, RCT-based impact evaluations of microfinance programmes have multiplied and, recently, a full issue of the *American Economic Journal* was dedicated to microfinance RCTs (Banerjee et al., 2015b). Since the first randomized evaluation of microlending took place (Banerjee et al., 2015a), these have been applied to evaluating

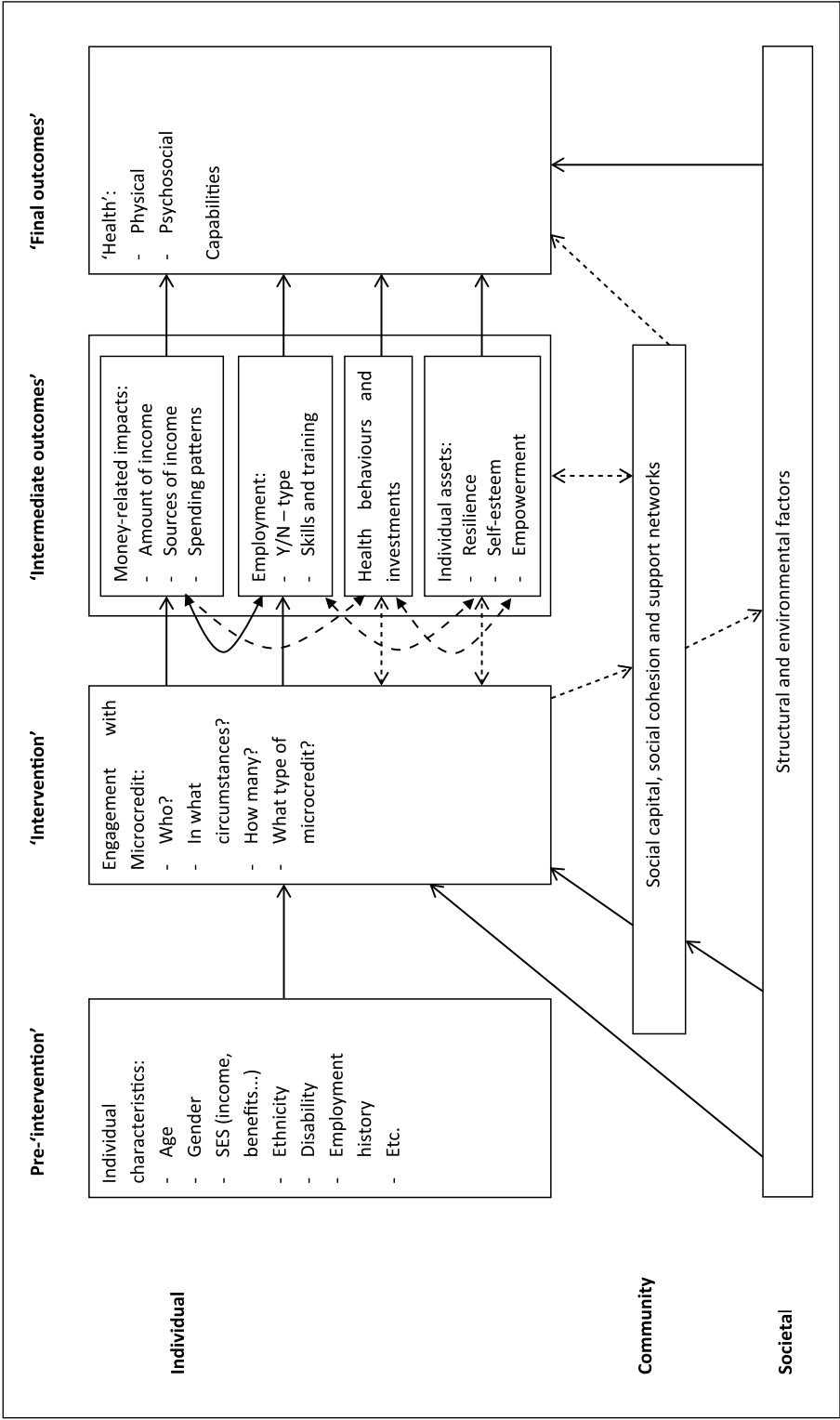


Figure 1. Conceptual framework: Microfinance, health and wellbeing.
SES: Socio-economic status.

not only the impact of different microcredit contracts, but also several other related financial products and credit-plus programmes (Ashraf et al., 2010; Fernald et al., 2008; Field et al., 2012, 2013; Giné and Karlan, 2014; Hamad et al., 2011; Jan et al., 2011; Karlan and Zinman, 2008, 2010, 2011; Kim et al., 2007; Pronyk et al., 2006, 2008; Ssewamala et al., 2010).

The growth of RCTs has, in part, been a reaction to concerns around the quality and validity of initial microcredit impact evaluations, specifically in disentangling causation from correlation (Banerjee et al., 2015b; Roodman and Morduch, 2013), and a noted need for more rigorous studies that are suitably designed to correspond to their particular setting (Armendariz and Morduch, 2010; Hulme, 2000). Further, the proliferation of RCTs reflects a growing trend in other areas of development economics research where evaluations of social interventions seek to replicate methods previously thought to be largely the domain of the medical field.

Critical articles have been written on the use of RCTs in development (Barrett and Carter, 2010; Cartwright, 2007; Davies et al., 2014; Eble et al., 2013; Ogilvie et al., 2009; Shaffer, 2011; Toroyan et al., 2000; Worrall, 2007). Most of these critiques focus on the lack of generalizability of RCT results (Cartwright, 2011), but others reflect on flaws with respect to their internal validity and the difficulties of replicating clinical-type experiments in a broader social context (Deaton, 2010; Shaffer, 2011). It has also been recognized that the economics literature on RCTs has, in the past, ignored reports on mistakes in the design, conduct and reporting of medical trials (Eble et al., 2013), some of which is related to the more balanced view within public health research that RCTs are not necessarily the 'gold standard' (Barrett and Carter, 2010; Cartwright, 2007; Deaton, 2010). Likewise there are serious ethical implications to consider in RCTs of socio-economic interventions (Barrett and Carter, 2010; Eble et al., 2013; Thomson et al., 2004).

Such critiques also exist of microfinance RCTs, particularly around internal and external validity. Queries regarding the neutrality of sampling techniques in various RCTs, such as a microinsurance RCT in Cambodia and a microcredit RCT in rural Morocco have placed question marks over internal validity claims (Bédécarrats et al., 2015; Morvant-Roux et al., 2014; Quentin and Guérin, 2013). Likewise the external validity of microfinance RCTs is further weakened (beyond concerns of generalizability) as their length tends to be limited, due to issues of cost and attrition, which narrows the scope over which outcomes are measured (Bédécarrats et al., 2015). This is particularly important when, for example, health is the examined outcome as changes are likely only observable over the long term; presenting short or medium-term results may be a misrepresentation of the 'true' effect. In addition, the limited insight that RCTs provide into *how* and *why* effects are found was highlighted by a microcredit RCT in rural Morocco (Crépon et al., 2015; Ravallion, 2009). Qualitative researchers were brought in after completion of the RCT to ascertain why demand for the loan product was lower than expected, as the RCT itself was unable to explain issues around human agency and behavioural dimensions (Morvant-Roux et al., 2014). These critiques highlight the limitations of RCTs and the value of other research methods both as complementary and alternative approaches.

In reflecting on how best to examine the effects of microcredit on health we build upon these critiques of microfinance RCTs by focusing on developments in thinking about study design in public health and raising an unexamined ethical issue around the staging of a microfinance RCT.

Learning from public health: Moving beyond RCTs

The clinical origins and application of RCTs guarantee their credibility and rigour amongst the scientific community. However, the enthusiasm with which they have been adopted by social scientists has contributed to the belief, particularly amongst some prominent development economists, that this study design on its own overrides any other.

In the field of public health, the legitimacy of RCTs as the ‘gold standard’ has been challenged with the ‘weight’ assigned to this research method being rebalanced so as to recognize the insights and understandings gained from quasi-experimental and observational approaches. This is because it is recognized that the causal chains that exist between the intervention and the outcome are much more complex than in clinical interventions (Barrett and Carter, 2010; Cartwright, 2007; Deaton, 2010; Worrall, 2007). Context tends to matter more, and the results of RCTs cannot be easily extrapolated to similar initiatives in different areas. Additionally, the causal pathways for public health interventions involve behavioural responses that go beyond the strictly biological ones that exist in clinical research (Barrett and Carter, 2010).

With causal pathways similar in complexity, microfinance evaluation could benefit from following the evolution in public health research, as documented in the guidelines on ‘Developing and evaluating complex interventions’ produced by the prestigious UK funder, the Medical Research Council (MRC) (2008).

This new phase for public health research, reflected in the MRC Guidelines, highlights the need to go beyond scientific rationalism to tackle modern problems such as obesity and mental health. A significant contribution to this debate identifies as a starting premise that population health improvement is conditional on a health-promoting societal context characterized by a culture in which healthy behaviours are the norm, with supportive institutional, social, and physical environments (Davies et al., 2014). This implies that environmental and social factors play a determining role in understanding mediating mechanisms that underlie the intervention-effect relationship (as shown in Figure 1). There is a general recognition that RCTs, on their own, cannot achieve a full understanding of such relationships.

Research methods in epidemiology, the core science for public health, have been adapting to these shifts in the nature and main purpose of public health and the limitations of the oft-assumed linear pathway, generating new and wider frameworks (Ogilvie et al., 2009). In public health, as in social interventions such as microfinance, research evaluation methods need to be able to assess effects deriving from complex pathways. While RCTs can identify direct short-term effects reasonably well, their efficacy deteriorates when the routes from the intervention to the effects are more indirect and circuitous. This makes the use of other non-experimental research methods in the evaluation of complex interventions equally necessary and valid to identify subjective and environmental correlates of behaviour. The sudden infant death syndrome (SIDS) campaign ‘Back to Sleep’, from the public health literature, illustrates the insights that can be achieved from the implementation of other research methods. The success of this campaign was determined through observational evidence that highlighted behavioural factors (position of baby) and poverty as risk factors for SIDS and could have been established two decades earlier if non-trial evidence had been synthesized in the same way that RCT evidence is (Ogilvie et al., 2009). Furthermore, incorporating qualitative methods into an evaluation, in addition to forming part of the required preparatory work of an evaluation (whether in terms of design and/or determining the adequacy or plausibility of the study);

can better inform the identified pathways to effect so providing richer insights for policy makers. Thus, we argue that evidence from non-randomized microcredit studies, quasi-experimental and qualitative, should not be dismissed as inaccurate and irrelevant; added value is gained from the use of other methods as the case of the microcredit RCT in rural Morocco shows (Crépon et al., 2015; Morvant-Roux et al., 2014). Microfinance researchers need to be critical and aware of the limitations of RCTs, particularly in the area of complex interventions, as well as of the fact that RCTs are not always feasible (Banerjee et al., 2015b) and present particular ethical dilemmas.

Ethical dilemmas: Learning from different contexts

As well as considering whether an RCT approach is appropriate to answer a particular research question in a given context, ethical issues associated with such a study must be examined. Key issues to consider from an ethical standpoint are those of equipoise and consent (Toroyan et al., 2000). While the literature has addressed the serious ethical implications that RCTs of socio-economic interventions present in practice, we feel considering the issue of equipoise in relation to the mounting of RCTs of microcredit in western contexts is illustrative and adds to this global debate.

Equipoise exists at the personal or clinical level and reflects uncertainty regarding the outcome of an intervention and has been described as ‘the principle, moral and practical, required to justify ethically a randomised controlled trial’ (Enkin, 2000: 757). Personal equipoise is the uncertainty of an individual physician regarding the outcome of a RCT (Toroyan et al., 2000). Awareness of a poorer treatment option combined with the physician’s ethical obligation to treat patients to the best of their ability would constitute a moral obligation for a physician to prevent a patient from partaking in a RCT. Similarly, clinical, or collective, equipoise reflects uncertainty or indifference regarding treatment types amongst the profession as a whole – no consensus exists concerning a preferred mode of treatment (Cook and Sheet, 2011; Edwards et al., 1998; Toroyan et al., 2000).

This begs the question of what this means for RCTs of microcredit. As previously outlined, the aim of providing microcredit is to enable currently-excluded individuals access to finance. Thus, precisely who is in equipoise and what is the relevance of this for policy? Of course, government and donors may be in equipoise and require best evidence about what works best for low-income communities. However, in policy terms, is it really the case that consideration could be given to stopping financial services when no equivalent alternatives exist and which, as indicated by demand, are taken up by low-income groups? Furthermore, should at-risk groups be denied access to credit-plus programmes that offer a health intervention alongside a loan until the end of a study period? On the ground, it is doubtful whether individual credit officers (in many respects the corollary of the physician in the medical context) would be in equipoise. Anyone would likely be judged as having the right to be considered for a loan, and, also, to receive such a loan should the credit officer judge them to be creditworthy, particularly as attempts have been made to limit the possibility of negative outcomes occurring. For example, in the UK, Community Development Finance Institutions (CDFIs), one of the main providers of microcredit, have been rebranded as the ‘responsible finance’ sector (Responsible Finance, 2015). These lenders aim to ensure that only those ‘who can afford to repay’ are offered credit and that ‘customers get the best deal and the best

outcome' (Responsible Finance, 2016). Thus credit officers should only lend when it appears as if it is in the best interest of the would-be borrower.

Severe ethical objections arise from using experimental methods to measure, for example, the health effects of a non-health intervention if that intervention provides important non-health benefits (Thomson et al., 2004) – in our case this is access to finance for those who have a need. Given that microcredit users have been found to be present-oriented (Bauer et al., 2012), an unintended consequence of denying or delaying individuals access to microcredit could be their seeking of higher-cost loans elsewhere, such as from informal moneylenders, payday or door-step lenders; thereby worsening a potentially precarious financial situation.

In the microfinance field the issue of equipoise has not been explicitly considered in the protocols or study design of RCTs. Implicitly, concerns around denial of credit may, in part, explain why some individual RCT designs were implemented using a form of randomization connected to credit scoring in which randomly selected applicants previously deemed marginal rejections were reconsidered; thus applicants received a microloan who otherwise would have been rejected (Fernald et al., 2008; Karlan and Zinman, 2010, 2011). However, giving loans to those who have failed to meet screening requirements could also be judged ethically dubious, the medical parallel being to offer inappropriate treatment to a patient for the sake of research. Likewise, cluster randomization (e.g. randomizing villages; Banerjee et al., 2015a) might be seen as a way of conducting a trial whilst avoiding the need to randomize at the individual level. The problem with this becomes one of relevance – the need to look at results at the cluster level when the uptake of microcredit at such a level might not even be considered by many in the population, thus dampening any potential impacts observed. This would be of particular concern in contexts such as the UK, where the market for microcredit is substantially smaller than in developing countries, because cluster RCTs require a greater sample size in order to achieve statistical power (Campbell et al., 2004; Lenton and Mosley, 2012).

Given the contextual nature of many RCTs of social and public health interventions, such as microcredit, it is then doubtful whether results from RCTs will bring resolution to equipoise, due to a lack of external validity (Deeming, 2013; Osrin et al., 2009). Thus serious questions remain around the ethics of subjecting trial participants to research where the value of the results could be questioned, especially given people's rights to access such services and the possibility of error in judgments arising from trial results. It is our belief that these considerations call into question whether it would be ethically possible to conduct a microcredit RCT in a western context. Such concerns are shared by UK microcredit providers that are collaborating in our research who do not consider microcredit RCTs to, ethically, be a viable option to evaluate their activities. These arguments are, of course, potentially relevant to all forms of microcredit RCTs and thus a further question is raised of why individuals in western contexts are treated differently to those in developing countries?

Innovating on methods

Recognition must be paid to the methodological development that RCTs represent in the microcredit research sector in terms of seeking to improve the internal validity and quality of impact evaluations. However, we argue that questions remain regarding the appropriateness of adopting this method to the exclusion of other important sources of evidence, particularly

given the difficulty of evaluating complex social interventions. Examining the effect of microcredit on health is the very epitome of such a complex intervention. The various interactions, pathways and potential areas of feedback outlined in Figure 1 highlight the importance of both understanding the human agency involved and individuals' subjective experiences; something which RCTs alone are incapable of achieving. Thus it is necessary to continue to innovate on methods so that such insight can be drawn which will enable the 'black box', through which RCTs suppose impact occurs, to become transparent.

One such innovation in the microfinance field, in need of more attention, is the systematic review. Prevalent in the medical field to summarize the results of randomized trials in order to examine the effectiveness of an intervention in attaining a particular impact, these have recently become more common within the microfinance research sector (Arrivillaga and Salcedo, 2014; Duvendack et al., 2011; Orton et al., 2016; Vaessen et al., 2014; van Rooyen et al., 2012) where increasing recognition has been given to the benefits of pooling studies and undertaking formal synthesis (Banerjee et al., 2015b). This itself is a significant development given that systematic reviews, in general, are noted for their ability to inform policy and practice (Dixon-Woods et al., 2006) and the state of knowledge on specific measures and mediating mechanisms. Furthermore, developments in this field have resulted in alternatives to the 'specialist' synthesis method of meta-analysis, such as narrative synthesis (Popay, 2006; Pope et al., 2007). This has allowed non-randomized study designs to achieve greater recognition within prestigious evidence-synthesis movements, such as The Cochrane Collaboration (Higgins and Green, 2011). Additionally, new insights can be garnered from this synthesis approach as it enables a juxtaposition and, at times, assimilation of findings from articles employing different study designs so increasing the variety of included studies (Dixon-Woods et al., 2004; Pope et al., 2007).

Another methodology with scope for innovation is bringing the so-called 'financial diaries' method to analysis of microfinance. The success of this method was shown in 'Portfolios of the Poor' (Collins et al., 2009). In this case an exhaustive approach to data collection, applied over a sustained period of time, resulted in rare depth and insight being gained into participant's financial lives which revealed the inter-temporal complexities of the money management strategies of the poor in developing economies. This method is now being applied in the USA to gain detailed information about financial management and to better understand attitudes about money (U.S. Financial Diaries, 2016). The attractiveness of this approach is that in-depth understanding of individuals' financial lives opens up the possibility of exploring the reasoning behind what we consider to be 'irrational' financial behaviours, analysing time and risk preferences and the role of microfinance in individuals' financial management strategies. Further methodological innovations involve incorporating 'health diaries' into this approach, enabling exploration of links between participant's financial lives and their health; we are currently undertaking such work which has been funded by the Chief Scientist Office (CSO) of the Scottish Government's Health Department. In addition to recording details of financial transactions (which can include expenditure on health) this approach involves collecting data on health and wellbeing indicators as well as respondents' subjective perceptions of the relationship between microcredit initiatives and products and their own and their community's health and wellbeing. Conceptual frameworks, such as Figure 1, can then be empirically informed and provide a platform for further exploration into the potential pathways through which microcredit may impact on health.

A methodology with, so far, extremely limited application in the microfinance sector is Q methodology. Q methodology is well established, combining qualitative and quantitative

methods to study ‘subjectivity’ (subjective opinions, values or beliefs) and has been applied in a wide variety of health and public policy research to study the *shared views* of stakeholders (Baker et al., 2006; Stephenson, 1935, 1953; Watts and Stenner, 2012). Potentially this methodology has a number of applications, such as in understanding and identifying barriers and facilitators in accessing microfinance initiatives (Cramm et al., 2012). Moreover, in evaluating the potential impacts of microcredit this method can be used, for example, to identify the shared perspectives of microcredit recipients with respect to the relationship between income and health and, in particular, the potential for income-based initiatives to have an impact on health when set alongside other health-promoting interventions in low-income communities. As such it can be viewed as another innovative method seeking to address the attribution problem in impact evaluation (Copestake, 2014) and one which provides insights into the subjective experiences of microcredit recipients. Q methodology is currently being used, in this way, in our CSO funded project and will inform future study designs around evaluating ‘microcredit as a public health initiative’; however, this method has scope to be applied by other researchers interested in designing studies to evaluate different effects of microcredit.

These methods are suggested not as some panacea to the attribution problem in complex interventions (it is our belief no such approach exists) rather to highlight that other methods beyond RCTs provide vital insights in their own right and can complement more standard evaluation approaches. Thus our aim is to enhance the tool-box available and acknowledge that mechanistic approaches to evaluation, such as RCTs, have limited application in complex areas. Other high quality non-experimental approaches, such as longitudinal comparative study designs, should not be ruled out just because of the higher face validity of RCTs. Such approaches are particularly valuable when, for example, changes in the outcome under consideration are only likely to be observed over a longer period of time, i.e. health. Additionally, specific tools now exist in public health research, such as those developed by the Effective Public Health Practice Project, which enable the methodological quality of randomized and non-randomized study designs to be assessed (Thomas, 1998). Assessing and comparing the quality of randomized and non-randomized study designs allows informed judgements about how much weight to attach to the results of particular studies.

Summary

The idea underpinning the developed conceptual framework is that enhancing access to microcredit, particularly in an advanced economy such as the UK, could be thought of as a participatory solution to health challenges in deprived communities. The multiple interacting components and complicated causal pathways identified, through which impact may occur, means microcredit should be considered a complex public health intervention (Petticrew, 2011). In providing a conceptual base from which the impact of microcredit on health might begin to be examined in western contexts we have additionally raised new insights in the global debate on impact evaluation and proposed innovations on methods for use in such evaluations. Rather than arguing against rigour in impact evaluations by suggesting alternatives to RCTs, we reiterate the call for more rigorous microcredit impact evaluation studies that are suitably designed to correspond to their particular setting (Hulme, 2000), of which, RCTs are one important part of an array of potential methods. We contend that the pursuit of trial-based evidence alone may be hampering the production of relevant evidence on microcredit’s public health (and other wider) impacts and it is our belief that

other non-experimental study designs such as quasi-experiments, as well as observational studies and other mixed and qualitative methods should be seen as a necessary part of any subsequent main study. Heeding such methodological lessons, identified from public health and other disciplines, would enable the global evidence base around microfinance to be enhanced and increase its potential in the field of public health.

Acknowledgements

This article emerged from conversations with colleagues at the Yunus Centre for Social Business and Health, Glasgow Caledonian University. We, the authorship team, thank these colleagues for their insights and critical conversation.

Funding

This work was funded by Chief Scientist Office (CSO) Scotland (project reference number CZH/4/1095).

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